### **PART I - ADMINISTRATIVE**

#### Section 1 General administrative information

	administrative information
Title of project	
S.T.O.I. Wildlife Land	Acquisition And Enhancements.
BPA project number:	20081
Contract renewal date (r	nm/yyyy): Multiple actions?
<b>Business name of agency</b> Spokane Tribe of Indians	, institution or organization requesting funding
Business acronym (if app	propriate) STOI
Proposal contact person	or principal investigator:
Name	B.J. Kieffer
<b>Mailing Address</b>	
City, ST Zip	Wellpinit, WA, 99040
Phone	(509) 258-7055
Fax	(509) 258-9600
Email address	Wildlife@iro.com
NPPC Program Measure Section 11, 11.2E.1, 11	e Number(s) which this project addresses
FWS/NMFS Biological ( N/A	Opinion Number(s) which this project addresses

# Other planning document references

N/A

### **Short description**

Acquisition of lands for habitat protection, restoration, enhancements for target species. Partial mitigation for inundation losses of habitat on the Spokane Indian Reservation due to construction of Grand Coulee Dam.

### **Target species**

Mule Deer, Sharp-Tailed Grouse, Western Meadowlark, Ruffed Grouse,

# Section 2. Sorting and evaluation

#### **Evaluation Process Sort**

CBFWA caucus	Special evaluation process	ISRP project type
	If your project fits either of	
Mark one or more	these processes, mark one	
caucus	or both	Mark one or more categories
☐ Anadromous	☐ Multi-year (milestone-	☐ Watershed councils/model
fish	based evaluation)	watersheds
Resident fish	☐ Watershed project	☐ Information dissemination
Wildlife     Wildlife	evaluation	Operation & maintenance
		☐ New construction
		Research & monitoring
		☐ Implementation & management
		Wildlife habitat acquisitions

# Section 3. Relationships to other Bonneville projects

Umbrella / sub-proposal relationships. List umbrella project first.

Project #	Project title/description	

### Other dependent or critically-related projects

Project #	Project title/description	Nature of relationship

# Section 4. Objectives, tasks and schedules

### Past accomplishments

Year	Accomplishment	Met biological objectives?
1996	Secured Funding for Partial Mitigation of	Yes
	losses due to inundation	
1997	Began purchasing lands for mitigation	Yes
1998	Secured 1833 acres of land for	Yes
	protection, finishing HEP Report to BPA	

and Management plans, HEP's completed on 1393.5 acres.	

### Objectives and tasks

Obj		Task	
1,2,3	Objective	a,b,c	Task
1	Acquire 1338.5 acres of land	a	obtain funding for purchases
		b	purchase the 1338.5 acres
2	Evaluation conditions	a	Conduct HEP's for Target Species to
			determine HU's for crediting.
		b	complete evaluation reports
		С	Develop mitigation plan, HU
			contract with BPA.
3	Develop management plans	a	work with the STOI IRMP
			Identification Team, BIA Foresrty,
			BIA Fire Management, to develop
			management plan for the acres.
4	Enhancement, Operation and	a	Design and implement enhancement
	Maintenance of property		projects including riparian and
			upland vegetation planting.

### Objective schedules and costs

Obj#	Start date mm/yyyy	End date mm/yyyy	Measureable biological objective(s)	Milestone	FY2000 Cost %
1	5/2000	12/2000	Securing 1338.5 acres of land		97.00%
2	12/2000	5/2001	Conduct Enhancement. HU Accreditation to BPA		
3	12/2000	5/2001	Management Plans and implementation of enhancements		2.00%
4	12/2000	5/2001	O&M		1.00%
				Total	100.00%

### **Schedule constraints**

Negotiation of purchase price may be a constraint for acquisition.

### **Completion date**

December 31, 2000

# Section 5. Budget

**FY99** project budget (BPA obligated): \$96,939

### FY2000 budget by line item

		% of	
Item	Note	total	FY2000
Personnel		%0	
Fringe benefits		%0	
Supplies, materials, non-	Restoration and Enhancement	%1	25,000
expendable property	supplies; shrubs, grass plantings		
	ect.		
Operations & maintenance		%0	
Capital acquisitions or	Acquisition of 1338.5 acres	%99	2,007,750
improvements (e.g. land,			
buildings, major equip.)			
NEPA costs		%0	
Construction-related		%0	
support			
PIT tags	# of tags:	%0	
Travel		%0	
Indirect costs		%0	
Subcontractor		%0	
Other		%0	
	ГОТАL BPA FY2000 BUDGET RE	EQUEST	\$2,032,750

### Cost sharing

Organization	Item or service provided	% total project cost (incl. BPA)	Amount (\$)
		%0	
		%0	
		%0	
		%0	
	Total project cost (incl	iding BPA portion)	\$2,032,750

### Outyear costs

	FY2001	FY02	FY03	FY04
Total budget	\$90,000	\$89,000	\$88,000	\$87,000

### Section 6. References

Watershed?	Reference
	Bonneville Power Administration (BPA). 1994. Blue Creek Winter Range:
	Wildlife Mitigation. Project Final Environmental Assessment. DOE/EA-
	0939, USDIE/BPA, Portland, OR.
	Bonneville Power Administration (BPA). 1997. Wildlife mitigation program
	final environmental report statement. DOE/EIS- 0246. Portland, OR.
	Creveling, J. and Renfrow, B. 1986. Wildlife protection, mitigation and
	enhancement planning for Grand Coulee Dam. Wash. Dept. Game. Olympia.
	Funded by USDOE/BPA, Portland, OR. as Project No. 86-74
	Merker, C. 1993. Wildlife mitigation and restoration for Grand Coulee Dam.
	Blue Creek Project Phase 1. Prepared for USDOE/BPA, Portland, OR as
	Project No. 91-062.

#### PART II - NARRATIVE

#### Section 7. Abstract

Efforts of the Spokane Tribe Grand Coulee Wildlife Mitigation Project are a portion of the Northwest Power Planning Council's (NPPC) overall Wildlife Mitigation Program **Goal.** This is to achieve and sustain levels of habitat and species productivity in order to fully mitigate for the losses that have resulted from construction and operation of the federal and non-federal hydroelectric system. Grand Coulee Dam is largest storage facility in the Federal Columbia River Power System. Grand Coulee Dam flooded over 80,000 acres of floodplain wildlife habitat. The Spokane Tribe lost and interim acreage of 3.900 acres along their reservation. The Tribal project goal is to partially mitigate for the 3,900 acres. The project finds relevancy under the interim 1993 Washington Coalition Agreement signed between Bonneville Power Administration and the tribes and agencies having wildlife management responsibilities in Washington (see section 11.3D.2 in the 1994 NPPC Fish and Wildlife Program). A loss statement was completed and accepted into the 1994 FWP (see table 11-4). Methods applied are/will follow accepted protocols as defined by the NPPC/CBFWA Wildlife Working Group, including that defined under the Wildlife Plan (Appendix G of FWP). The latter is the standard operating procedure for wildlife projects.

Expected Outcomes include protecting an additional 1338.5 acres of wildlife habitat. With a total of 1120 HU's of habitat protected for wildlife. Baseline HU's protected would be 515 mule deer, 200 sharp-tailed grouse, 357 meadowlark, and 48 ruffed grouse. Meadowlark was used in pace of Mourning Dove, because meadowlark is a specialist in its biological needs and Mourning Dove is more of a generalist. Limiting factors identified by using HEP's will be addressed and improved. Target Species response will be measured and correlated with habitat improvements measured using Habitat Evaluation Procedures (HEP). This will be accomplished under a Timeframe of 5 years post-protection for enhancement practices, then in perpetuity/ life of Grand Coulee project for Operations and Maintenance activities. M&E will be conducted using the Wildlife Plan guidelines.

### Section 8. Project description

#### a. Technical and/or scientific background

Grand Coulee Dam flooded over 80,000 acre floodplain/riverine habitat. The Spokane Tribe lost an interim acreage of 3,900, which once was a central part of their hunter/gather culture. Habitat Evaluation Procedures (HEP) were applied to the impact, and methodology and losses were documented (see Creveling and Renfrow 1986) and accepted into the NPPC Wildlife Program in 1989. This is an ongoing Land/Habitat-based project proposal first approved by the Implementation Planning Process (IPP) in 1991 under the 1989 Wildlife Program.

Goal of this project is to partially mitigate for the inundation losses on the Spokane Indian Reservation. Wildlife losses will be mitigated on the Reservation, and measured using HEP models based on a subset species used in the 1986 loss assessment. They will therefore be in-kind and in-place. Techniques to mitigate were explained in Merker 1993. An Environmental Assessment was drafted for public review, and completed with a FONSI in 1994 (BPA 1994). There is currently 1833 acres of land secured for wildlife protection on the Spokane Reservation, with partial mitigation accomplished with the Spokane/BPA Agreement signed in 1996. We are now requesting funds to acquire an additional 1338.5 acres of land for wildlife mitigation, protection and enhancement.

#### b. Rationale and significance to Regional Programs

Grand Coulee Dam flooded over 80,000-acre floodplain/ riverine habitat. The Spokane Tribe lost an interim acreage of 3,900, which once was a central part of the Spokane culture for hunting, fishing and gathering. Habitat Evaluation Procedures (HEP) were applied to the impact, and methodology and losses were documented (see Creveling and Renfrow 1986) and accepted into the NPPC Wildlife Program in 1989. This is a new project, but also ongoing, first approved by the Implementation Planning Process (IPP) in 1991 under the 1989 Wildlife Program.

Goal of the project is to partially mitigate for the inundation losses, which occurred on the Spokane Indian Reservation. Wildlife losses will be mitigated on the Reservation, and measured using HEP models based on a subset of species used in the 1986 loss assessment. They will therefore be in-place and in-kind. Techniques to mitigate are explained in Merker 1993. An Environmental Assessment was drafted for public review, and completed with a FONSI in 1994 (BPA 1994). As part of the 1993 Wildlife Coalition Agreement with BPA, the Spokane Tribe was reserved a share of funding to implement the Project No. 96BI39922. This project has currently secured 1833 acres for wildlife mitigation, protection, and enhancements. The Spokane Tribe is currently working with lands owners to possibly purchase another 1338.5 acres of land for wildlife mitigation,

protection, and enhancements to partially mitigate for inundation losses which occurred on the Reservation.

#### **Furthering Program Goals:**

**Credit** – The HU's gained from protecting existing values, or from creating new HU's through enhanced habitat condition, will be credited against losses identified in Table 11-4 of the 1994 FWP. Credits have already accrued for the losses to the indicator species white-tail deer, grouse, and yellow warbler (riparian forest losses).

Contribution – Past impact assessments have used levels of animal populations as the standard by which impacts and benefits of a hydro or mitigation project were measured. Problems with this approach include the great variability of uncontrollable factors such as weather-induced migration patterns, annual productivity cycles, temporal disturbance factors (e.g. adjacent timber sales, road construction, etc.) Only be collecting a great quantity and quality of data over several years could variability be reduced through averaging, This is very expensive, time consuming and not very efficient.

The next generation measurement technique was habitat-based using HEP. It is an accepted tenet in biology that habitat is the most important factor in determining long-term population status. However, this method is based on creating somewhat subjective models.

#### c. Relationships to other projects

This project is for partial mitigation for Grand Coulee Dam. Other projects in this effort include the Colville Confederated Tribes Hellsgate, State of Washington Swanson Lakes, and National Parks Service Peregrine Falcon Reintroduction. All these projects were measured against the NPPC program criteria, as well as additional criteria as defined by the Wildlife Work Group. They were ranked and funded in order, along with many other projects outside the Grand Coulee impact area. They will be credited against the losses in Table 11-4.

#### **d. Project history** (for ongoing projects)

In 1996, the Spokane Tribe entered into an Intergovernmental Contract No. 96BI39922 with Bonneville Power Administration, this was for partial mitigation due to inundation of lands caused by Grand Coulee Dam. The remaining acquisition funds were spent down December 1998. Total Land base acquired for wildlife protection and enhancement within the Spokane Indian Reservation total 1833 acres. With a total HU Accreditation of 2352 for target species. There remains 3908 HU's to mitigate for losses on the Spokane Indian Reservation.

The STOI Wildlife Program has identified 1338.5 acres for purchase, which would mitigate for 1120 more HU's for Target Species within the Reservation. Leaving 2788 HU's for mitigation.

#### e. Proposal objectives

#### **Objectives:**

- 1. Protect in perpetuity no less than **1338.5 acres** of wildlife habitat as partial mitigation for Grand Coulee Dam losses, which occurred on the Spokane Indian Reservation. TASKS
  - a. Located 1338.5 acres of land for wildlife mitigation, protection, and enhancements for present and future condition (see enclosed criteria).
  - b. Negotiate with willing sellers using standard real estate techniques.
  - c. Place purchased lands under Tribal land protection covenants.
- 2. Protect and/ or create a total 1120 HU's for the target species.
  - a. 515 HU's for Mule deer, 357 HU's for Meadowlark, 200 HU's for Sharp-tailed g grouse, 48 HU's for Ruffed grouse.
  - b. Apply HEP to measure before and after condition of habitat; identify limiting factors to Target species (for HEP methods see Merker 1993), apply population indexing techniques to compare, correlate with HEP results (this is to include standard line transect pellet group counts to compute deer use days by habitat type before and after implementation of restoration and/or enhancements.
  - c. Create management plans and budgets.
  - d. Implement improvement techniques approved by the STOI Interdisciplinary Team process of Tribe.
  - e. Maintain benefits through long-term Operation and Maintenance efforts.
- 3. Report Results
  - a. Compile Land Protection, HEP and population results, and correlate the latter two.
  - b. Report in standard format on an annual basis to BPA and the Wildlife Working Group.

Methods have been described elsewhere, including in the NPPC Wildlife Plan

#### f. Methods

#### **Objectives:**

- 1. Protect in perpetuity no less than **1338.5 acres** of wildlife habitat as partial mitigation for Grand Coulee Dam losses, which occurred on the Spokane Indian Reservation. TASKS
  - a. Located 1338.5 acres of land for wildlife mitigation, protection, and enhancements for present and future condition (see enclosed criteria).
  - b. Negotiate with willing sellers using standard real estate techniques.
  - c. Place purchased lands under Tribal land protection covenants.
- 2. Protect and/ or create a total **1120 HU's** for the target species.

- a. 515 HU's for Mule deer, 357 HU's for Meadowlark, 200 HU's for Sharp-tailed grouse, 48 HU's for Ruffed grouse.
- b. Apply HEP to measure before and after condition of habitat; identify limiting factors to Target species (for HEP methods see Merker 1993), apply population indexing techniques to compare, correlate with HEP results (this is to include standard line transect pellet group counts to compute deer use days by habitat type before and after implementation of restoration and/or enhancements.
- c. Create management plans and budgets.
- **d.** Implement improvement techniques approved by the STOI Interdisciplinary Team process of Tribe.
- e. Maintain benefits through long-term Operation and Maintenance efforts.

#### 4. Report Results

- a. Compile Land Protection, HEP and population results, and correlate the latter two.
- b. Report in standard format on an annual basis to BPA and the Wildlife Working Group.

Methods have been described elsewhere, including in the NPPC Wildlife Plan

#### g. Facilities and equipment

Equipment on hand within the Spokane Tribe of Indians Wildlife Program, or available within other Tribal Programs, and donated without charge to the effort include:

- 1. three pc's
- 2. color scanner and printer for producing maps
- 3. digitizer
- 4. Silviculture equipment/tools for forest mensuration.
- 5. Fence repair equipment, diggers, stretchers etc.
- 6. Two Storage buildings
- 7. Office Facility

Cooperative Programs and Agencies Include:

- 1. Bureau of Indian Affairs Realty Office Branch for assistance in ownership/Title, land descriptors, principle contacts.
- 2. Tribal legal assistance for recording of purchase of lands.
- 3. Tribal Forestry and Range for donation/cost share of heavy equipment and qualified operators.
- 4. Local High School District to contract growing and planting native poplars.

#### h. Budget

The budget that the Spokane Tribe of Indians is requesting for a new, on-going mitigation project is \$2,032,750.00 to acquire and enhance 1338.5 acres of land for mitigation of inundation lands on the Reservation.

The purchase of the lands would be \$2,007,750.00 and would require an additional \$25,000.00 to restore and/or enhance for increased wildlife benefits for the above named target species.

### Section 9. Key personnel

Principal Investigator:

B.J. Kieffer, STOI Wildlife Program Manager

BS Degree, Wildlife Resources, University of Idaho, Dec. 1995.

Habitat Evaluation Procedures Certification (HEP), Yakima, WA. August 1998.

#### **Related Work Experience**:

March 1, 1998 to Present – STOI Wildlife Program Manager.

#### **BPA Processes:**

- 1. Assisting the Wildlife Habitat Biologist with HEP Reports, Management Plan.
- 2. Preparing for spring enhancement and restoration on mitigation lands.
- 3. Working with local high school to harvest and grow native poplars from the Spokane Indian Reservation and replant during spring.

#### **Tribal Process:**

- 1. Developing a Watershed Management plan within approximately 7000 acres, with 335 of these acres being Wildlife Mitigation lands, and working to develop a working group with a local community.
- 2. Wildlife Population monitoring of Big Game within the Spokane Indian Reservation
- April 1, 1996 to March 28, 1998 STOI Wildlife Habitat Biologist. Worked on assessing vegetation on mitigation lands, writing management plan, and HEP report to BPA.
- 1994 USDA, Wildlife Technician. Bighorn National Forest, Buffalo, WY

Rosegen Stream Surveys, Vegetation Monitoring, Mist netting for Neotropical Birds.

#### Kelly Singer, STOI Wildlife Habitat Biologist.

BS Degree, Natural Resource Management, Washington State University, May 1995.

Habitat Evaluation Procedures Certification (HEP) Yakima, WA. August 1998.

#### **Related Work Experience:**

August 5, 1998 to Present – STOI Wildlife Habitat Biologist HEP completion on mitigation lands. Finalizing HEP report BPA, Working on completing management plans for mitigation lands. Some test plots for native poplars on mitigation lands.

March – July 1998 – Conservation Tech 1, Nebraska Game and Parks Commission.

Prescribed burning to enhance vegetation, food plot establishment, Wildlife population surveys, tree plantings, noxious weed control, Equipment maintenance, game check stations.

April – November 1997 – Conservation Tech 1, Nebraska Game and Parks Commission.

Prescribed burning to enhance vegetation, food plot establishment, Wildlife population surveys, tree plantings, noxious weed control, Equipment maintenance, game check stations.

#### Twa-le Abrahamson, STOI Wildlife Technician

Working on A.S.S. Degree from SKC, Wellpinit, WA. 1998.

Habitat Evaluation Procedures Certification (HEP), Yakima, WA. August 1998.

#### **Related Work Experience:**

July 22, 1998 to Present – STOI Wildlife Technician

Assisting the Wildlife Habitat Biologist on preparing HEP Report and Management Plans. Working on Tables for the two reports. Working on restoration and enhancement activities to begin in the

spring.

October 1996 to February 1998 – Environmental Engineering, Wormer and Associates, Spokane, WA.

Word processing for Environmental Engineer.

## Section 10. Information/technology transfer

- 1. Annual Reports to BPA on accomplishments and achievements.
- 2. Annual CBFWA Project Presentation.
- 3. Through NPPC Wildlife Work Group/CBFWA Wildlife Caucus.

### Congratulations!